

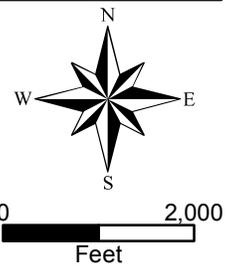
Source: ESRI World Street Map

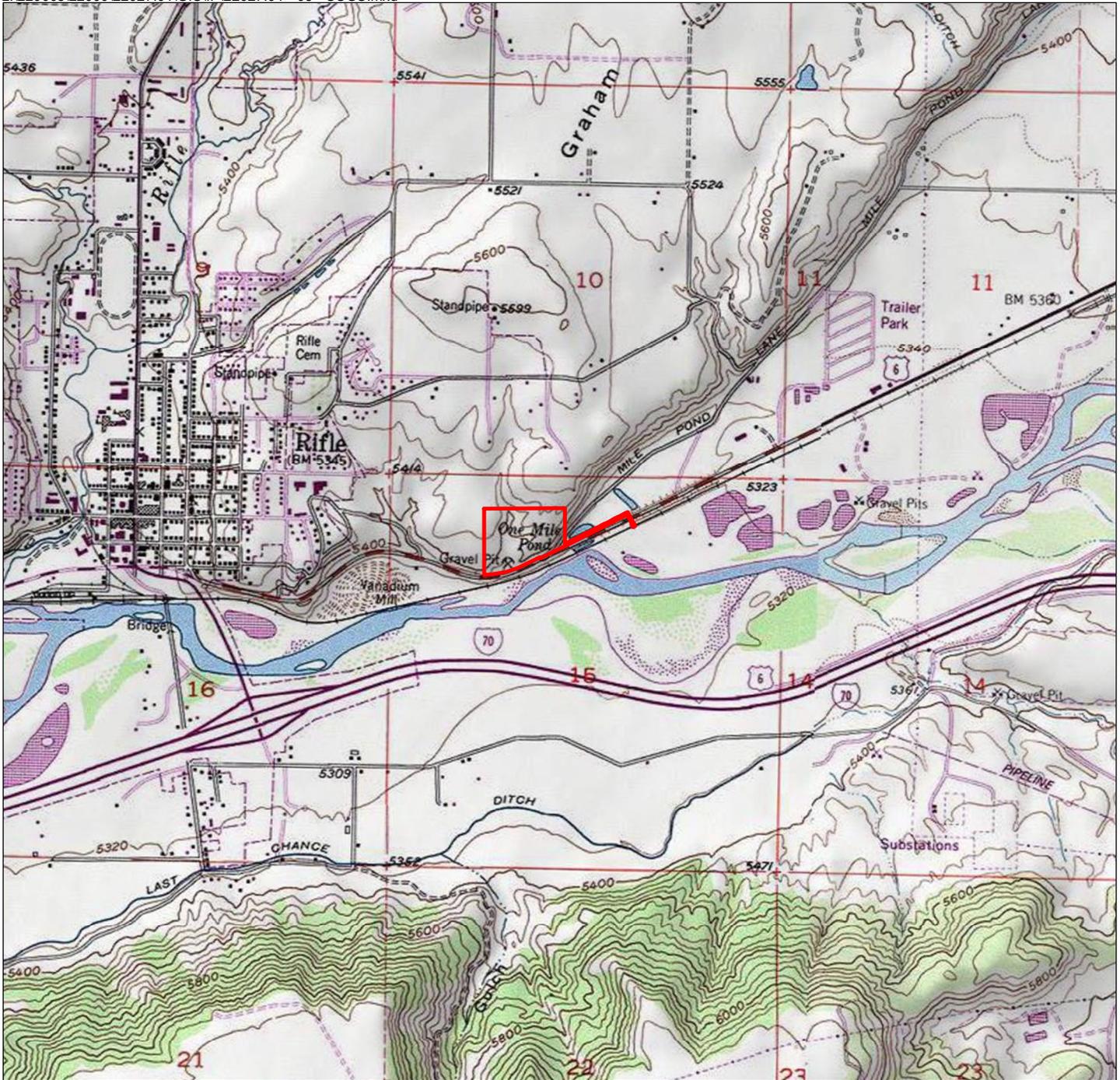
Vicinity Map
Rifle Regional Water Purification Facility
WSSI #22027.01
Original Scale: 1" = 2000'



Rifle, CO

 Project Area



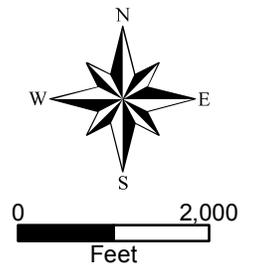


USGS Quad Map
Rifle, CO 1979 revised 1985
Rifle Regional Water Purification Facility
WSSI #22027.01
Original Scale: 1" = 2000'

Latitude: 39° 31' 53" N
Longitude: 107° 45' 53" W

Hydrologic Unit Code (HUC): 1401005

 Project Area



RIFLE REGIONAL WATER PURIFICATION FACILITY (RRWPF)
EXHIBIT 6
SUMMARY OF WOUS IMPACTS

IMPACT NUMBER	PEM (SF)	PEM (AC)	PSS (SF)	PSS (AC)	RE (Avg. Width) (SF)	RE (Avg. Width) (AC)	RE (Avg. Width) (LF)	TOTAL IMPACT AREA (SF)	TOTAL IMPACT AREA (AC)	TOTAL IMPACT LENGTH (LF)	VOLUME/TYPE OF FILL BELOW MHW/OHW (CY)	WETLAND/STREAM IMPACT DESCRIPTION**
1	43,985	1.010	5,329	0.122	105	0.002	105	49,419	1.135	105	594 / Native Soil	NT, V, PE, E
2	876	0.020	-	-	-	-	-	876	0.020	-	-	NT, V, PE
3	1,693	0.039	-	-	-	-	-	1,693	0.039	-	4 / Riprap; 1 / Raw Water Pipe; 28 / Native Soil	NT, V, PE
4	-	-	-	-	148	0.003	148	148	0.003	148	3 / Native Soil	NT, NV, PE, E
5	-	-	-	-	10	0.000	10	10	0.000	10	2.4 / Riprap	NT, NV, PE, E
6*	886	0.020	643	0.015	-	-	-	1,529	0.035	-	-	NT, V, TE*
Temporary Total (SF)	886	-	643	-	-	-	-	1,529	-	-		
Temporary Total (LF)	-	-	-	-	-	-	-	-	-	-		
Temporary Total (AC)	-	0.020	-	0.015	-	-	-	-	0.035	-		
Permanent Total (SF)	46,554	-	5,329	-	263	-	-	52,146	-	-		
Permanent Total (LF)	-	-	-	-	-	-	263	-	-	263		
Permanent Total (AC)	-	1.069	-	0.122	-	0.006	-	-	1.197	-		
Overall Total (SF)	47,440	-	5,972	-	263	-	-	53,675	-	-		
Overall Total (LF)	-	-	-	-	-	-	263	-	-	263		
Overall Total (AC)	-	1.089	-	0.137	-	0.006	-	-	1.232	-		

*Note, this is a temporary impact which will be restored to original grade and therefore will not be mitigated for.

**Use all that apply: T = Tidal; NT = Nontidal; V = Vegetated; NV = Nonvegetated; TE = Temporary; PE = Permanent; PR = Perennial; IN = Intermittent; E = Ephemeral

TYPE OF WETLAND / WATERS OF THE US:

RE = Ephemeral Stream Channel
PEM = Palustrine Emergent Wetland
PSS = Palustrine Scrub Shrub Wetland

**RIFLE REGIONAL WATER PURIFICATION FACILITY (RRWPF)
EXHIBIT 7
PLANS, PROFILES AND CROSS-SECTIONS AS APPLICABLE TO
IMPACTS TO WATERS OF THE U.S.
GENERAL NOTES**

1. These conceptual land development plans are being submitted to the U.S. Army Corps of Engineers and Colorado Department of Public Health and Environment for Section 404 and 401 Permit Application Purposes only. Building(s) and other improvement(s) types, sizes, layouts, and proposed uses may vary without affecting such permits as long as the nature and scope of impacts to Jurisdictional Wetlands and other Waters of the U.S. are not changes.
2. The Ordinary High Water mark in non-tidal wetlands is typically coincident with the elevation at the edge of the delineated wetland. The Ordinary High Water Mark in non-tidal streams is typically coincident with the top of the stream channel scar. The Ordinary High Water mark is not depicted on these plans due to the extremely small, narrow dimensions of the ephemeral streams observed on this site. The dimensions of these channels are approximately six (6) inches deep and one (1) foot wide.
3. Average water depths are not shown on these plans because standing water is typically only temporarily present in these wetlands after significant rain, snowmelt, or other runoff producing event. Similarly, water depth in the small ephemeral streams on the site varies with time of year, time since last rainfall, and location within the channel.

PERMIT PLAN SHEET INDEX

1. PERMIT PLAN SHEET INDEX
2. OVERALL IMPACT MAP (24" X 36")
3. OVERALL IMPACT MAP (8.5" X 11")
4. IMPACT AREAS #1 & #6 - PLAN VIEW
5. IMPACT AREAS #1 - CROSS SECTION A-A'
6. IMPACT AREA #1 - CROSS SECTION B-B'
7. IMPACT AREA #6 - CROSS SECTION F-F'
8. IMPACT AREA #2 - PLAN VIEW
9. IMPACT AREA #2 - CROSS SECTION C-C'
10. IMPACT AREA #3 - PLAN VIEW
11. IMPACT AREA #3 - CROSS SECTION D-D'
12. IMPACT AREAS #4 & #5 - PLAN VIEW
13. IMPACT AREA #5 - CROSS SECTION F-F'

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Topography provided by Bookcliff Survey Services, Inc.;
proposed improvements provided by SGM and Malcolm Pirnie
and are used as a base for this exhibit.

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**RIFLE REGIONAL WATER
PURIFICATION FACILITY**

Wetland Plan View

*Proposed Impacts to Nontidal
Waters of the U.S.*

City of Rifle, Colorado

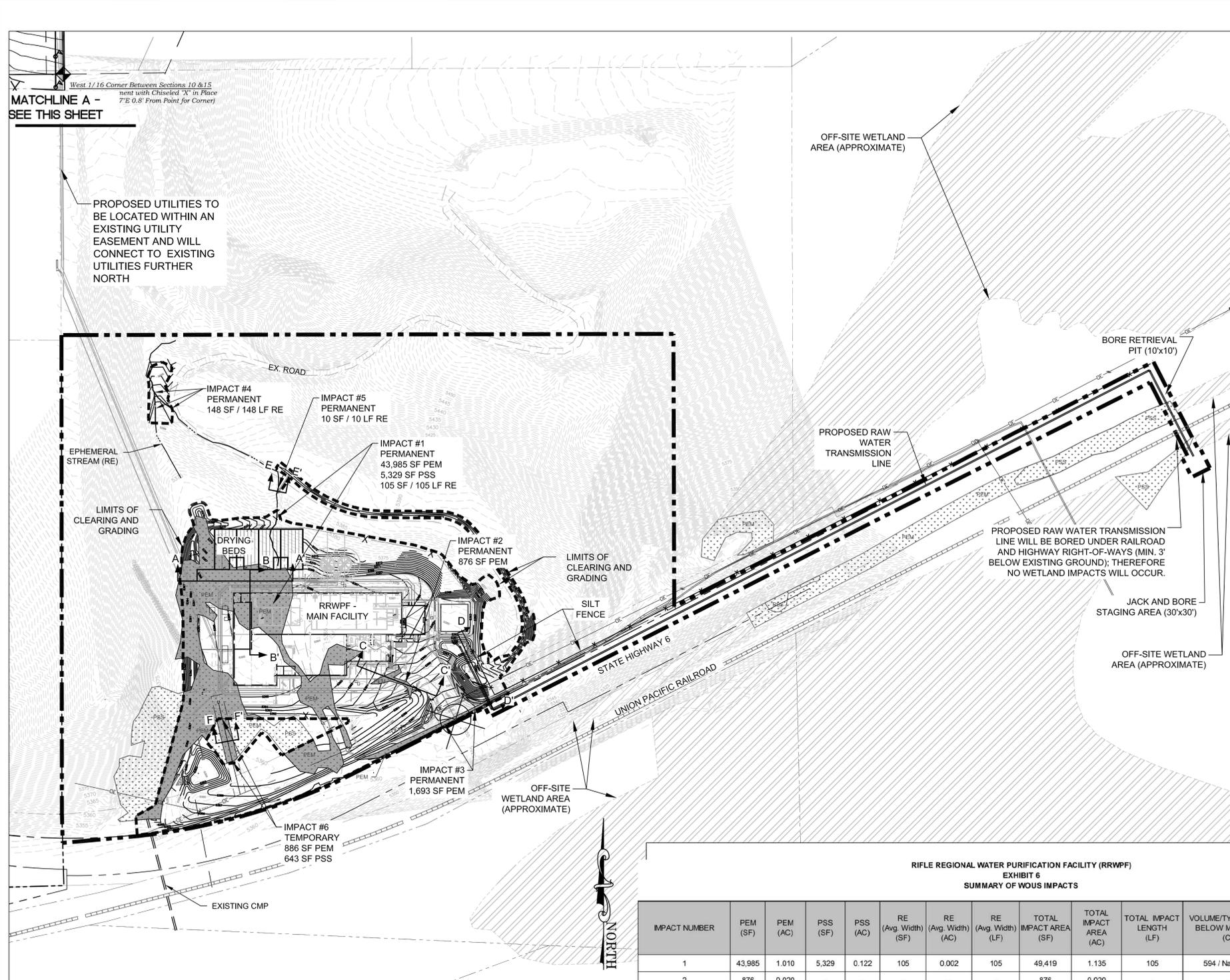
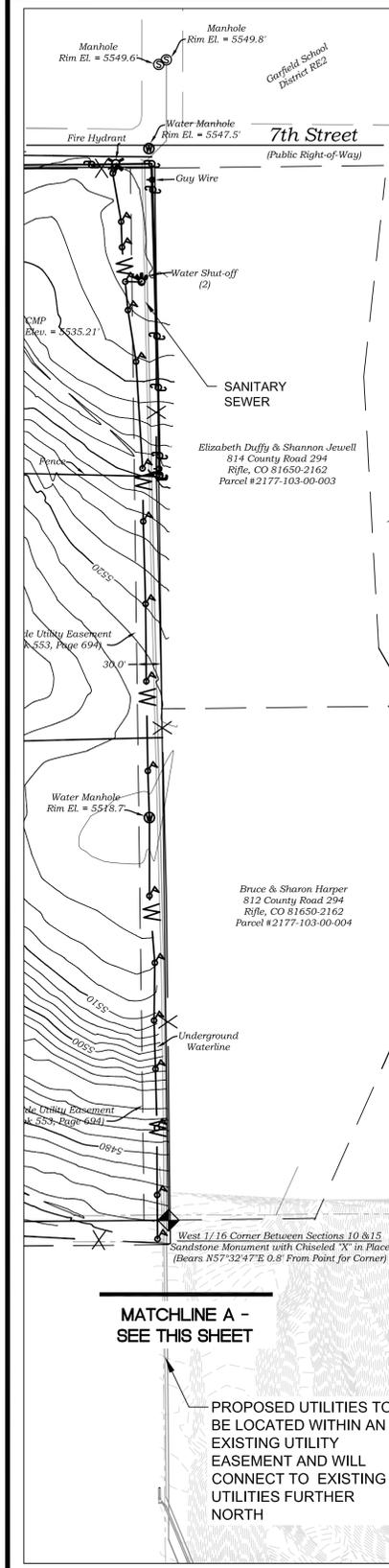
Sheet Title:

**GENERAL NOTES AND
PERMIT PLAN SHEET INDEX**

Date: NOVEMBER 2012

Scale: N/A

Sheet: 1 of 13



LEGEND

- SITE BOUNDARY
- LIMITS OF CLEARING AND GRADING
- EPHEMERAL STREAM
- JURISDICTIONAL WETLAND AREA
- PROPOSED IMPACT AREA
- OFF-SITE WETLAND AREAS (APPROXIMATE)

GRAPHIC SCALE
100 0 50 100 200 400
(IN FEET) 1 foot = 100 ft.

RIFLE REGIONAL WATER PURIFICATION FACILITY (RRWPF)
EXHIBIT 6
SUMMARY OF WOUS IMPACTS

IMPACT NUMBER	PEM (SF)	PEM (AC)	PSS (SF)	PSS (AC)	RE (Avg. Width) (SF)	RE (Avg. Width) (AC)	RE (Avg. Width) (LF)	TOTAL IMPACT AREA (SF)	TOTAL IMPACT AREA (AC)	TOTAL IMPACT LENGTH (LF)	VOLUME/TYPER OF FILL BELOW MHW/OHW (CY)	WETLAND/STREAM IMPACT DESCRIPTION*
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3	1,693	0.039	-	-	-	-	-	1,693	0.039	-	4 / Riprap; 1 / Raw Water Pipe; 28 / Native Soil	NT, V, PE
4	-	-	-	-	148	0.003	148	148	0.003	148	3 / Native Soil	NT, NV, PE, E
5	-	-	-	-	10	0.000	10	10	0.000	10	-	NT, NV, PE, E
6*	886	0.020	643	0.015	-	-	-	1,529	0.035	-	-	NT, V, TE*
Temporary Total (SF)	886	-	643	-	-	-	-	1,529	-	-	-	-
Temporary Total (LF)	-	-	-	-	-	-	-	-	-	-	-	-
Temporary Total (AC)	-	0.020	-	0.015	-	-	-	-	0.035	-	-	-
Permanent Total (SF)	46,554	-	5,329	-	263	-	-	52,146	-	-	-	-
Permanent Total (LF)	-	-	-	-	-	-	263	-	-	263	-	-
Permanent Total (AC)	-	1.069	-	0.122	-	0.006	-	-	1.197	-	-	-
Overall Total (SF)	47,440	-	5,972	-	263	-	-	53,675	-	-	-	-
Overall Total (LF)	-	-	-	-	-	-	263	-	-	263	-	-
Overall Total (AC)	-	1.089	-	0.137	-	0.006	-	-	1.232	-	-	-

- NOTES:**
- THE BOUNDARIES OF JURISDICTIONAL WETLANDS AND OTHER WATERS OF THE UNITED STATES (WOUS) LOCATED ON THE RIFLE REGIONAL WATER PURIFICATION FACILITY PROPERTY WERE DELINEATED BY ENVIRONMENTAL SOLUTIONS, INC. IN SEPTEMBER 2010 AND SURVEY LOCATED BY BOOKCLIFF SURVEY SERVICES, INC. IN OCTOBER 2010. THE RESULTS OF THIS DELINEATION ARE DESCRIBED IN ENVIRONMENTAL SOLUTIONS' REPORT DATED DECEMBER 2010. A SITE VISIT WITH THE U.S. ARMY CORPS OF ENGINEERS (COE) TO CONFIRM THE WETLAND BOUNDARIES WAS CONDUCTED ON APRIL 18, 2011 AND AN ADDENDUM TO THE DECEMBER 2010 DELINEATION REPORT WAS SUBSEQUENTLY SUBMITTED ON APRIL 27, 2011, BASED ON MINOR CHANGES TO WOUS BOUNDARIES DISCUSSED IN THE FIELD. THE 2010 DELINEATION AND 2011 ADDENDUM WERE CONFIRMED BY THE COE WITH A PRELIMINARY JURISDICTIONAL DETERMINATION ISSUED ON MAY 19, 2011 (COE #SPK-2011-00253).
 - TOPOGRAPHY AND SURVEY INFORMATION WERE PROVIDED BY BOOKCLIFF SURVEY SERVICES, INC. SITE PLANS WERE PROVIDED IN DIGITAL FORMAT BY SCHMUESER GORDON MEYER (SGM) AND MALCOLM PIRNIE/ARCADIS AND USED AS A BASE MAP FOR THIS IMPACT EXHIBIT. MINOR GRAPHICAL CHANGES WERE MADE AND TEXT RELATING TO JURISDICTIONAL WETLANDS AND OTHER WOUS WAS ADDED BY WSSI.
 - LIMITS OF IMPACTED WETLANDS SHOWN HEREIN ARE BASED UPON CURRENT LAND DEVELOPMENT PLANS AND RENDERINGS FOR SUBMISSION TO THE COE FOR PERMIT REQUEST PURPOSES ONLY. BUILDINGS AND OTHER IMPROVEMENT TYPES, LAYOUTS, AND PROPOSED USES MAY VARY WITHOUT AFFECTING SAID PERMITS AS LONG AS THE NATURE AND SCOPE OF IMPACTS TO JURISDICTIONAL WETLANDS AND OTHER WOUS ARE NOT CHANGED.
 - OFF-SITE WETLAND AREAS ARE APPROXIMATE AND BASED OFF OF DESKTOP RECONNAISSANCE. OFF-SITE WETLAND AREAS WERE NOT DELINEATED, CONFIRMED, OR SURVEY LOCATED.

*Note, this is a temporary impact which will be restored to original grade and therefore will not be mitigated for.

**Use all that apply: T = Tidal; NT = Nontidal; V = Vegetated; NV = Nonvegetated; TE = Temporary; PE = Permanent; PR = Perennial; IN = Intermittent; E = Ephemeral

TYPE OF WETLAND / WATERS OF THE US:
 RE = Ephemeral Stream Channel
 PEM = Palustrine Emergent Wetland
 PSS = Palustrine Scrub Shrub Wetland
 L:\220004\220004\22027_01\A\envi07-REGSD\Ex6_Impact_Summary_Table_2012-10-31.xls\CURRENT IMPACTS

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 Phone 703 679 5600 • Fax 703 679 5601
 wetlandstudies.com

Exhibit 7:
OVERALL IMPACT MAP

Prepared For: **CITY OF RIFLE**
Rifle Regional Purification Facility
RIFLE, COLORADO

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REVISIONS		App. By	Date
No.	Description		

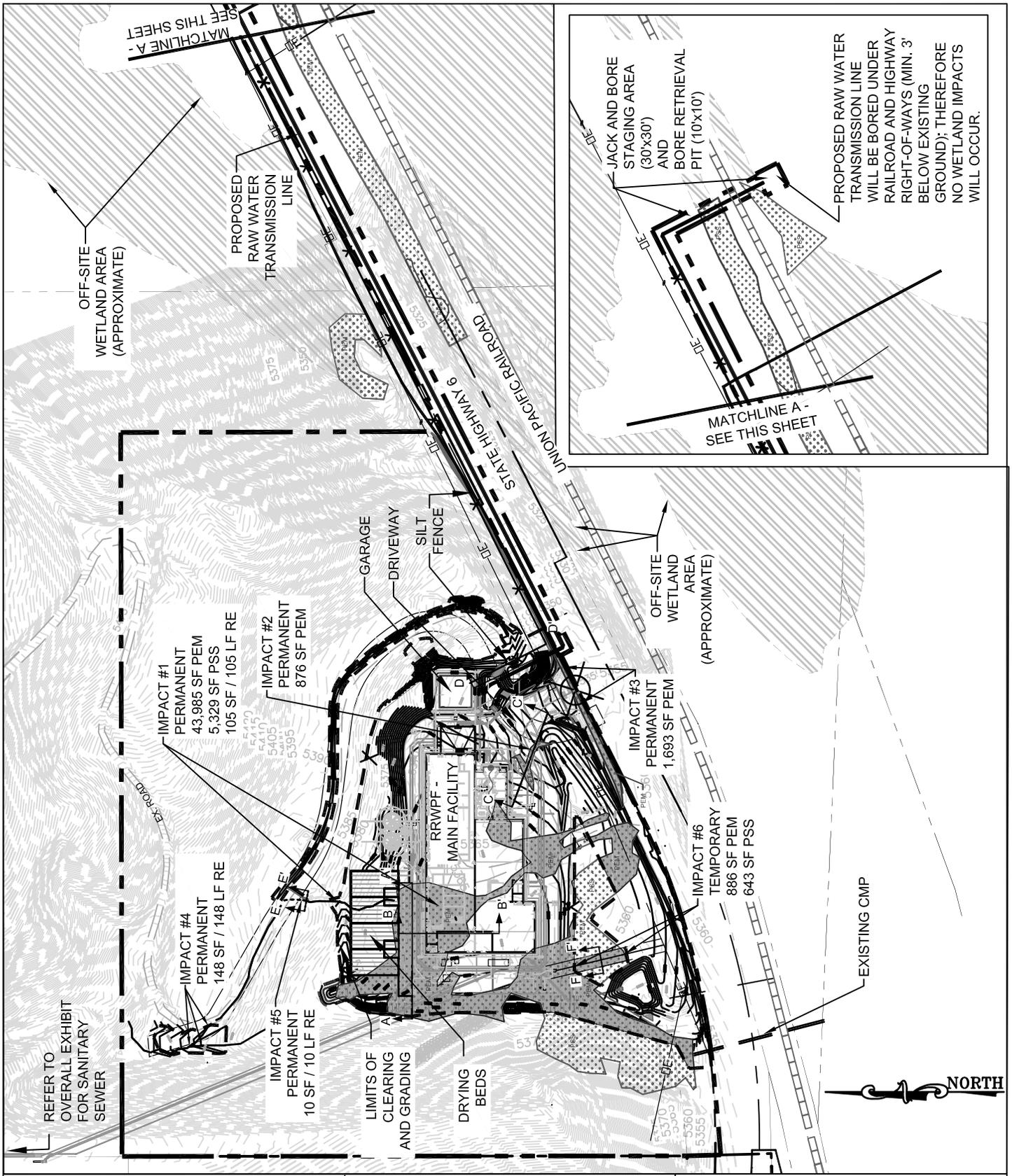
DATE: NOVEMBER 2012 SCALE: 1" = 100'

Horizontal Datum: _____
 Vertical Datum: _____
 Boundary and Topo Source: _____
 See Notes 1 and 2

Design	Draft	Approved
KLP	KLP	DCL

Sheet #
2 of 13

Computer File Name: _____



Topography provided by Bookcliff Survey Services, Inc.; proposed improvements provided by SGM and Malcolm Pirnie and are used as a base for this exhibit.

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RIFLE REGIONAL WATER PURIFICATION FACILITY

Wetland Plan View

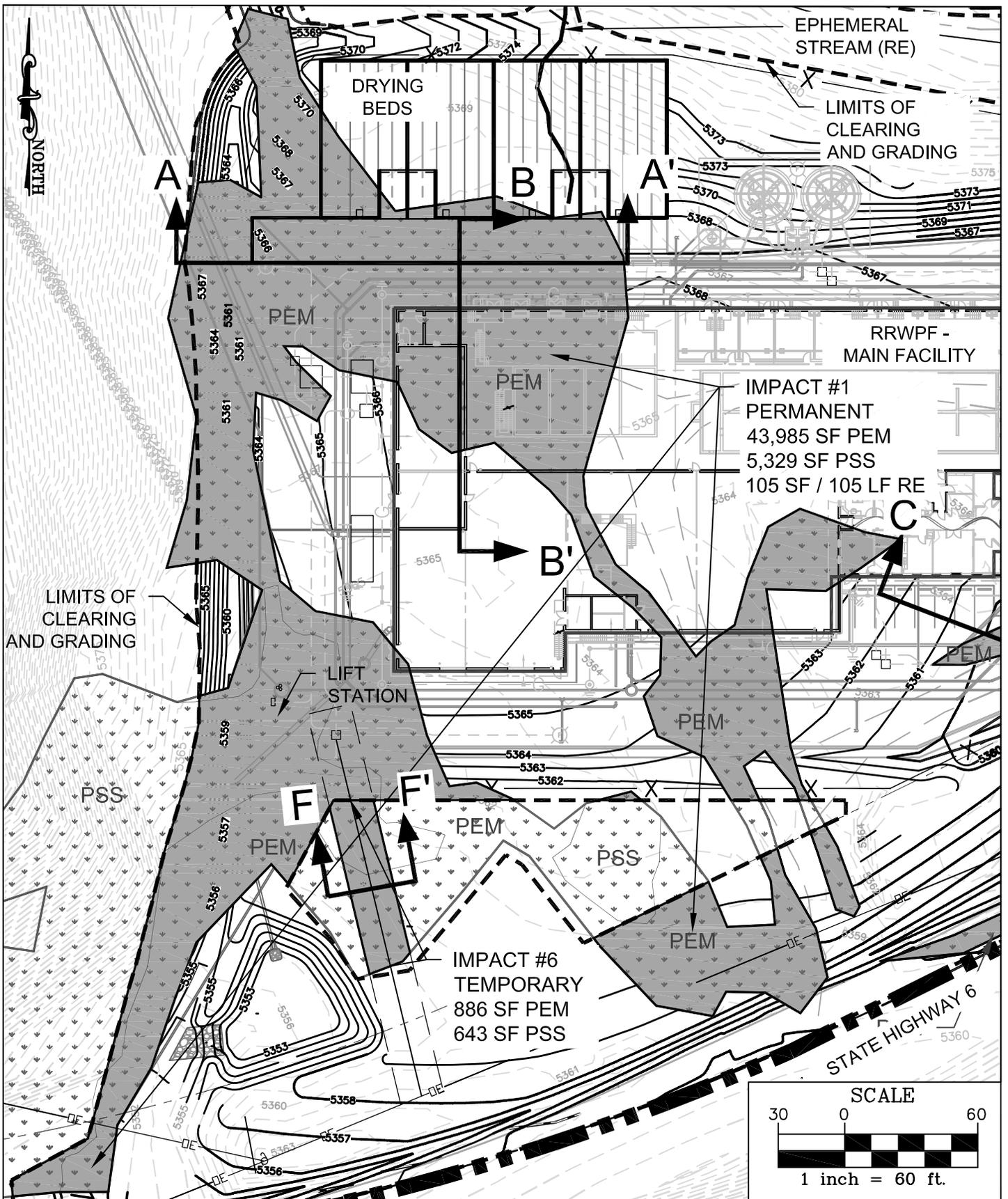
Proposed Impacts to Nontidal Waters of the U.S.

City of Rifle, Colorado

Overall Impact Map
 (8.5 X 12)

Date: NOVEMBER 2012

Scale: 1" = 200' Sheet: 3 of 13



Topography provided by Bookcliff Survey Services, Inc.; proposed improvements provided by SGM and Malcolm Pirnie and are used as a base for this exhibit.

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RIFLE REGIONAL WATER PURIFICATION FACILITY

Wetland Plan View

Proposed Impacts to Nontidal Waters of the U.S.

City of Rifle, Colorado

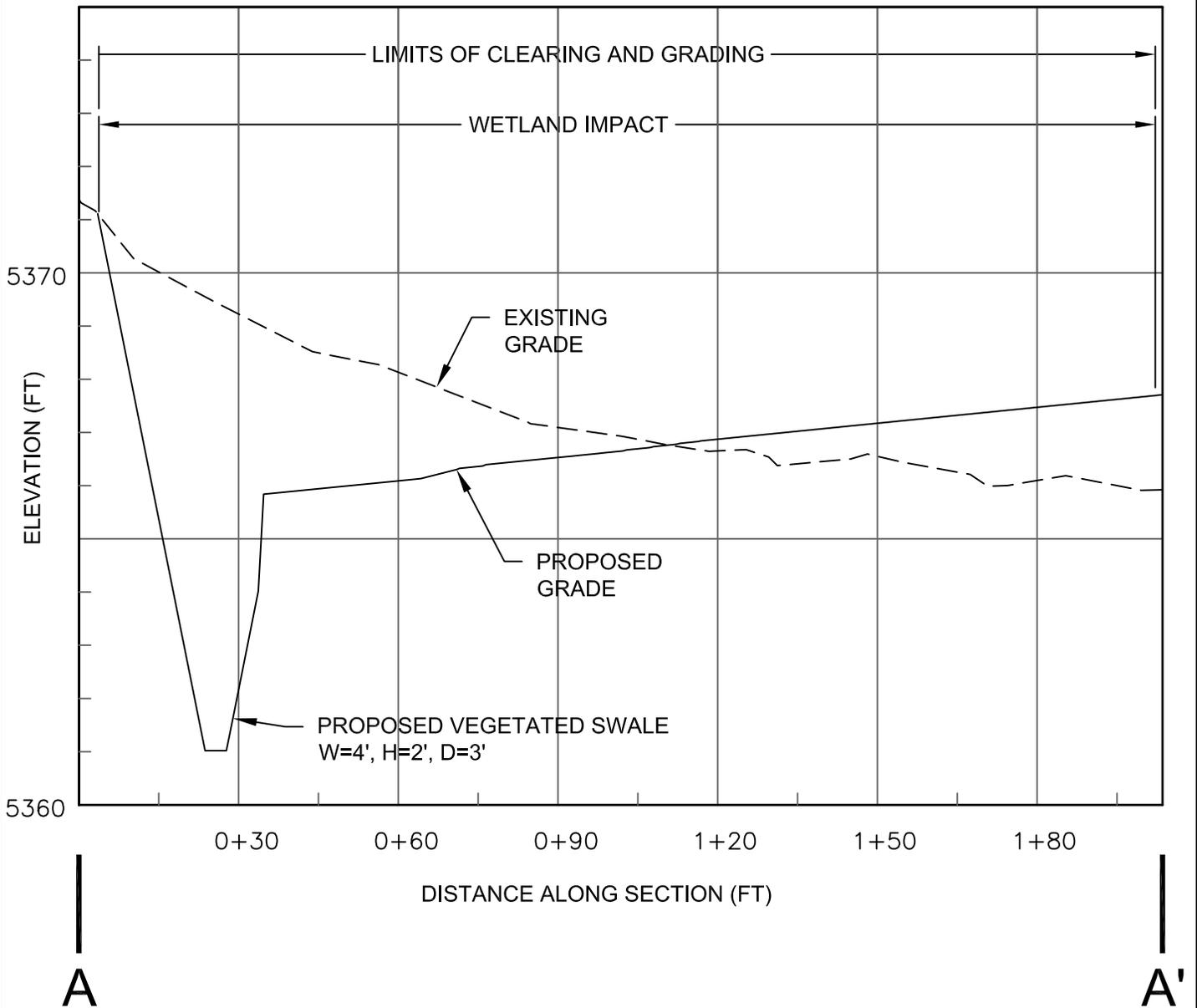
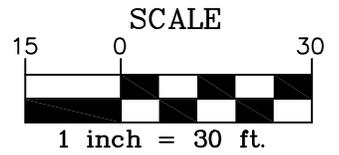
IMPACT #1 & #6

IMPACT #1	IMPACT #6
43,985 SF PEM	886 SF PEM
5,329 SF PSS	643 SF PSS
105 SF / 105 LF RE PERMANENT	TEMPORARY

Date: NOVEMBER 2012

Scale: 1" = 60'

Sheet: 4 of 13



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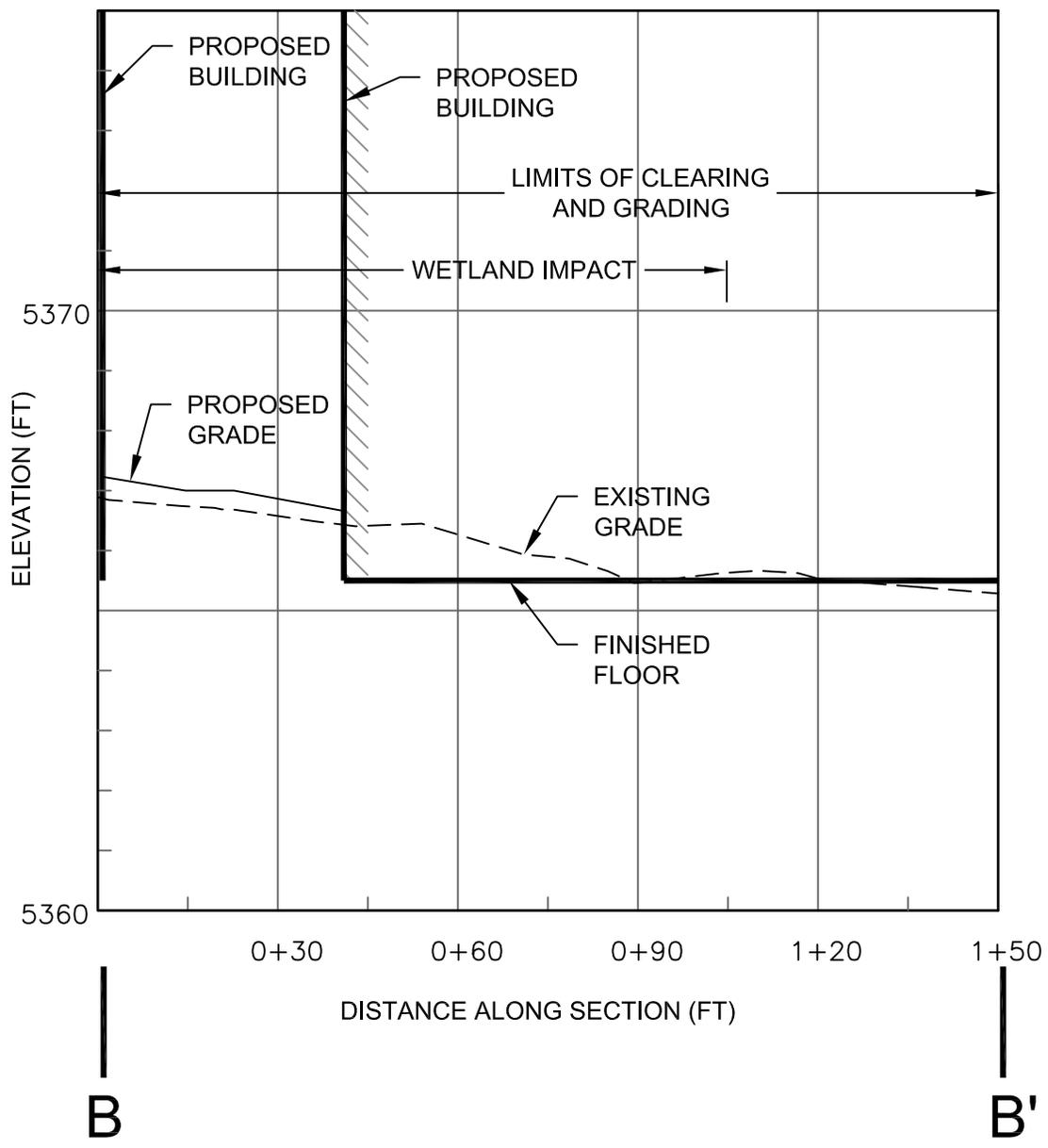
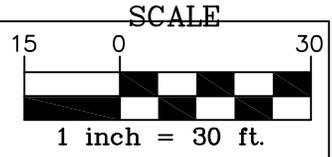
RIFLE REGIONAL WATER
PURIFICATION FACILITY
PROFILE VIEW
IMPACT 1
City of Rifle, Colorado

SECTION A - A'

Date: NOVEMBER 2012

Scale: H: 1" = 30'
V: 1" = 3'

Sheet: 5 of 13



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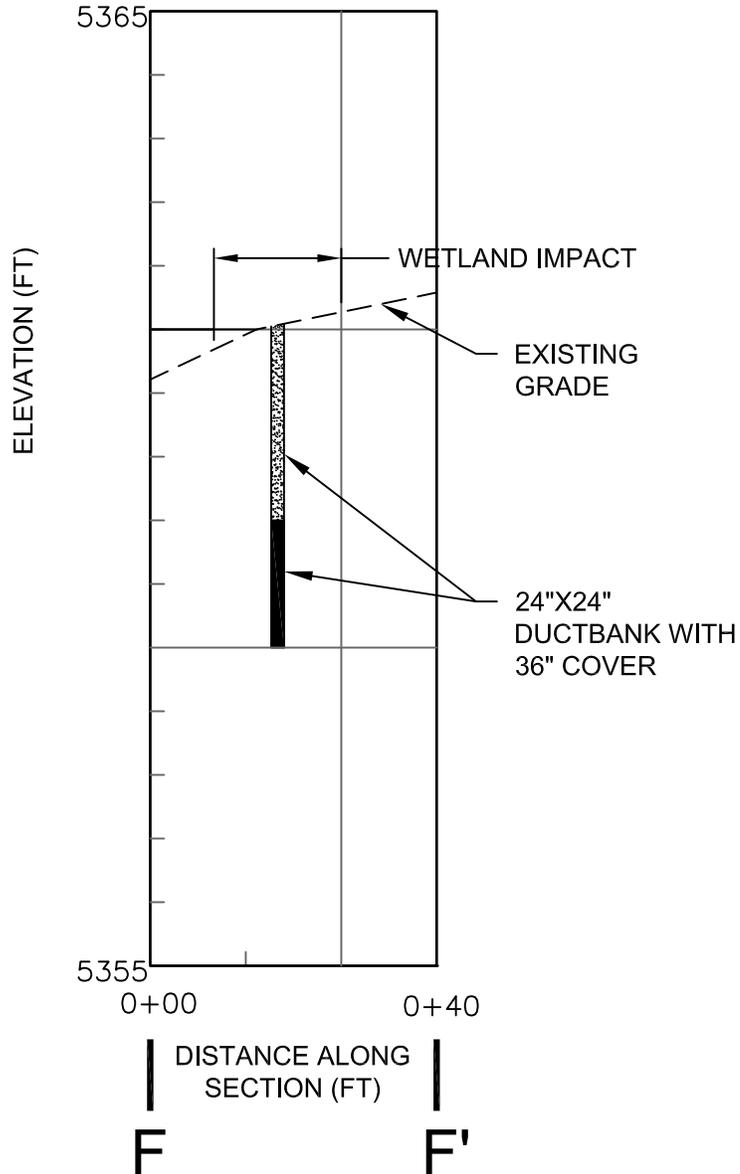
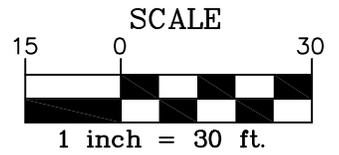
RIFLE REGIONAL WATER
PURIFICATION FACILITY
PROFILE VIEW
IMPACT 1
City of Rifle, Colorado

SECTION B - B'

Date: NOVEMBER 2012

Scale: H: 1" = 30'
V: 1" = 3'

Sheet: 6 of 13



Applicant:
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100 Fillmore Street, Suite 200
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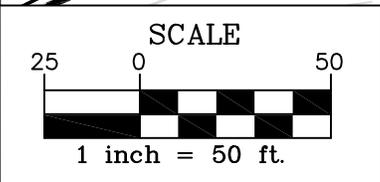
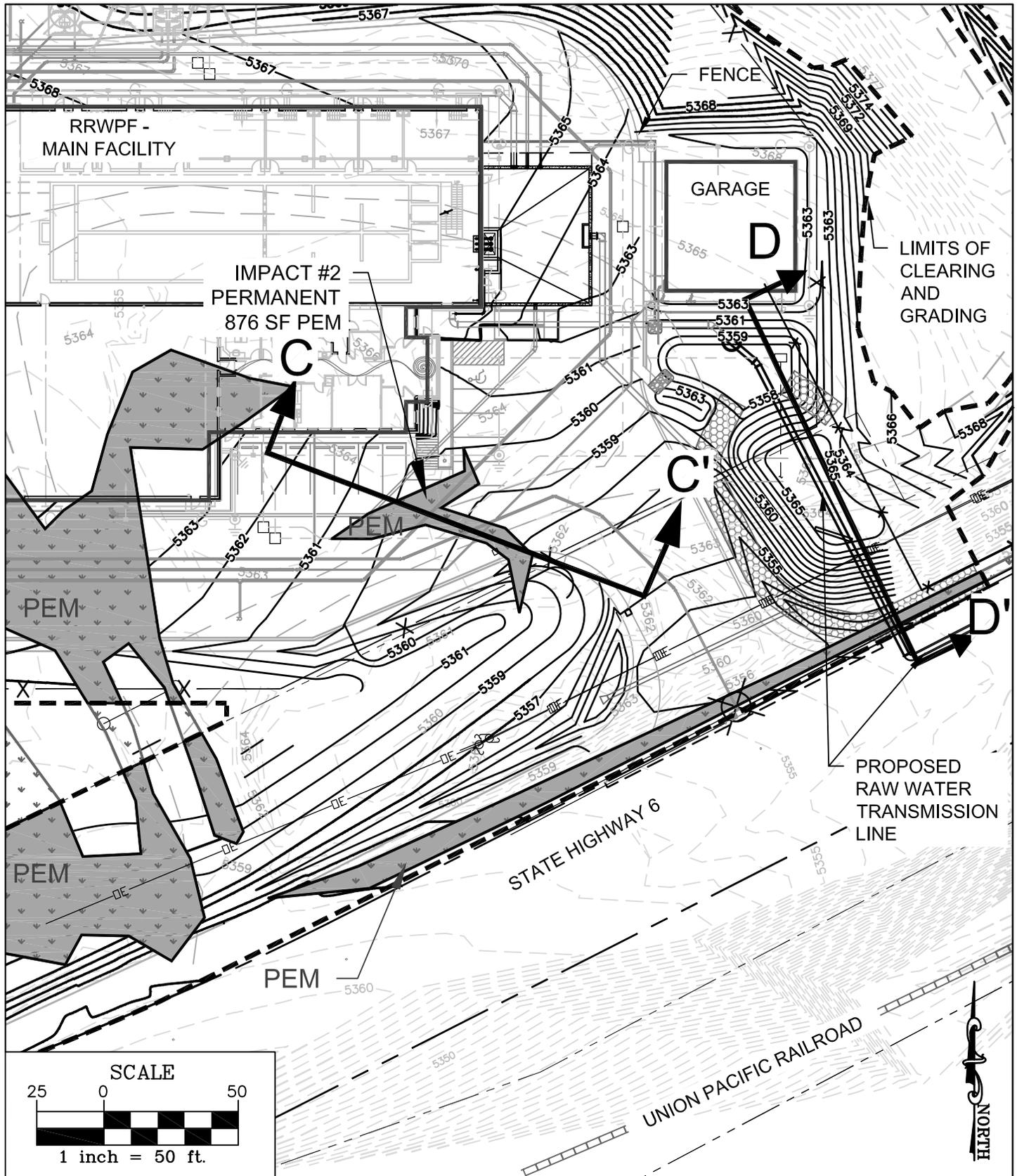
RIFLE REGIONAL WATER
PURIFICATION FACILITY
PROFILE VIEW
IMPACT 6
City of Rifle, Colorado

SECTION F - F'

Date: NOVEMBER 2012

Scale: H: 1" = 30'
V: 1" = 3'

Sheet: 7 of 13



Topography provided by Bookcliff Survey Services, Inc.; proposed improvements provided by SGM and Malcolm Pirnie and are used as a base for this exhibit.

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 Gainesville, Virginia 20155

RIFLE REGIONAL WATER PURIFICATION FACILITY

Wetland Plan View

Proposed Impacts to Nontidal Waters of the U.S.

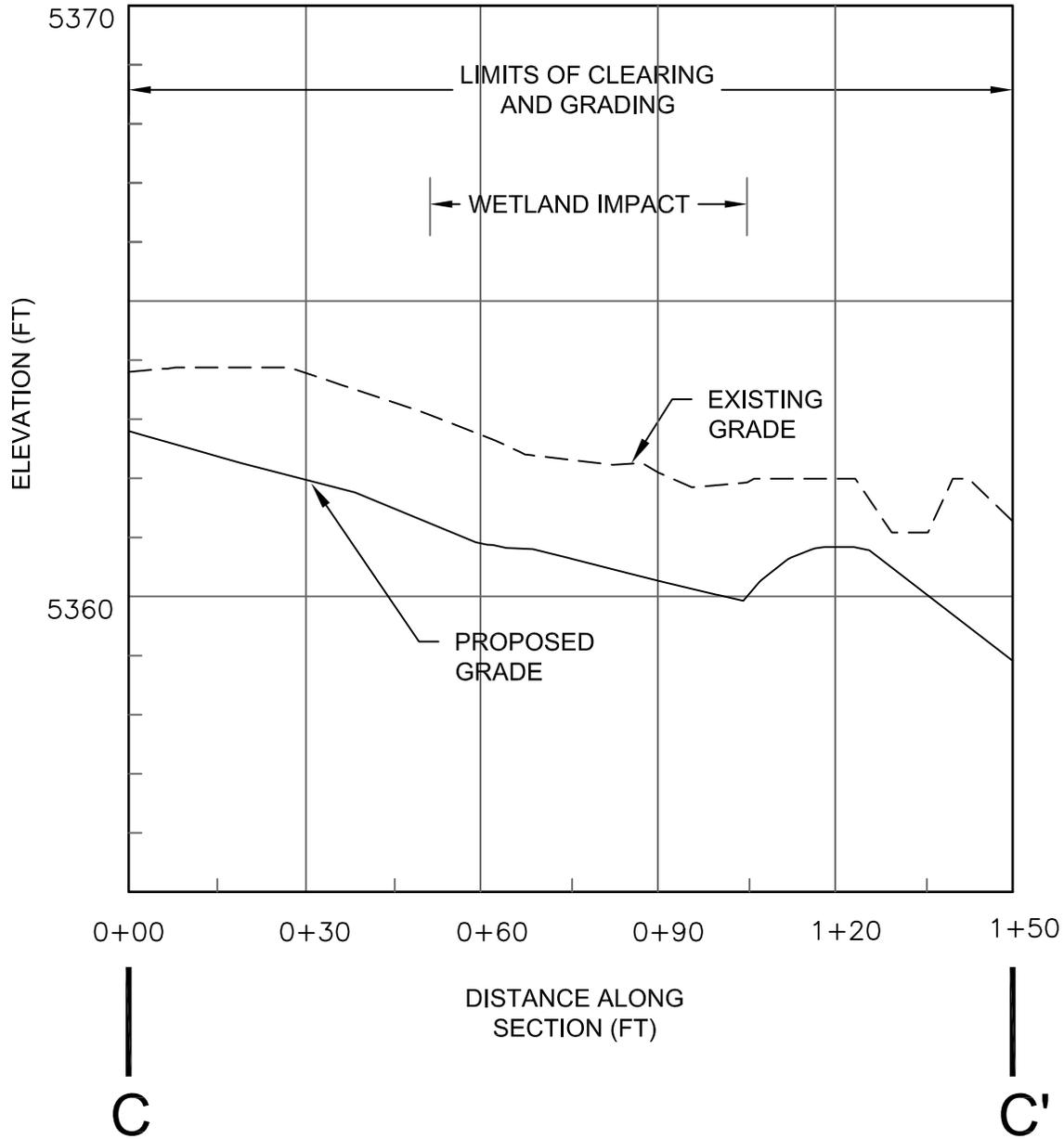
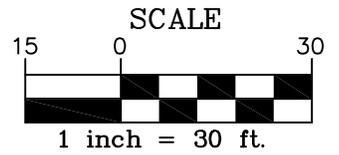
City of Rifle, Colorado

IMPACT #2
 876 SF (PERM)
 PERMANENT

Date: NOVEMBER 2012

Scale: 1" = 50'

Sheet: 8 of 13



Applicant:
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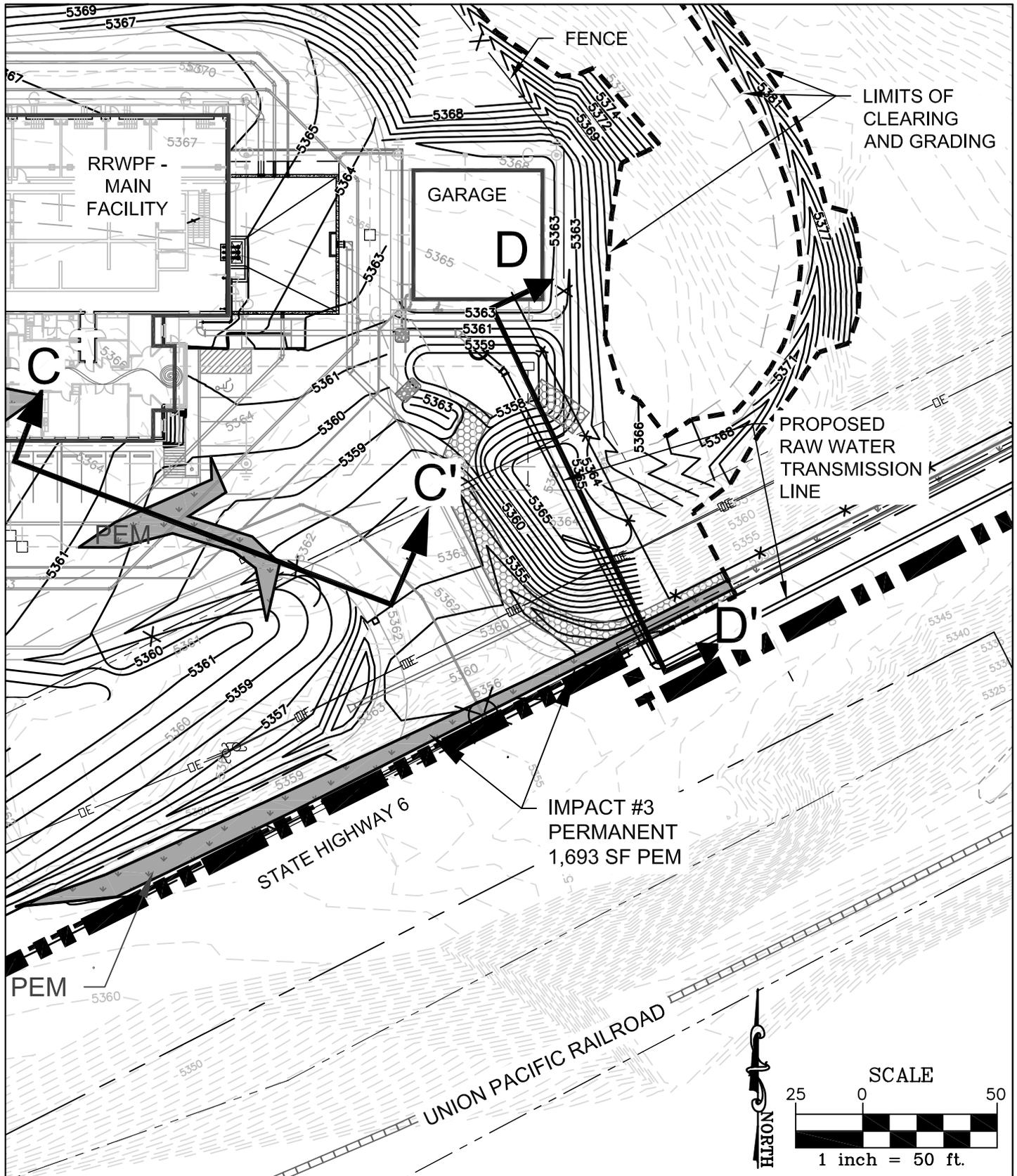
RIFLE REGIONAL WATER
PURIFICATION FACILITY
PROFILE VIEW
IMPACT 2
City of Rifle, Colorado

SECTION C - C'

Date: NOVEMBER 2012

Scale: H: 1" = 30'
V: 1" = 3'

Sheet: 9 of 13



Topography provided by Bookcliff Survey Services, Inc.;
 proposed improvements provided by SGM and Malcolm Pirnie
 and are used as a base for this exhibit.

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 Gainesville, Virginia 20155

RIFLE REGIONAL WATER PURIFICATION FACILITY

Wetland Plan View

Proposed Impacts to Nontidal
 Waters of the U.S.

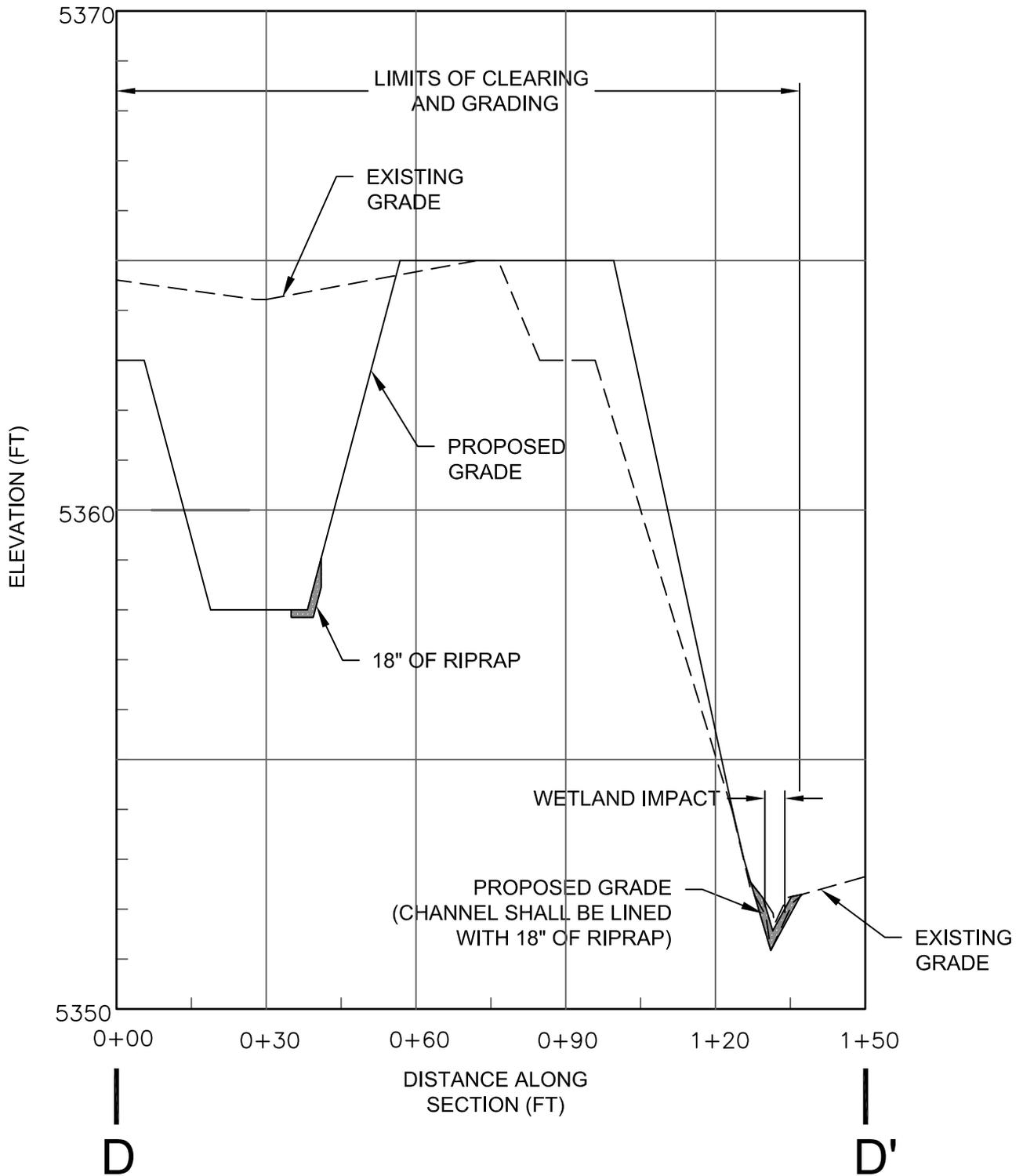
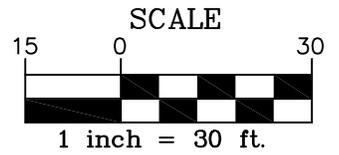
City of Rifle, Colorado

IMPACT #3
 1,693 SF PEM
 PERMANENT

Date: NOVEMBER 2012

Scale: 1" = 50'

Sheet: 10 of 13



Applicant:
Malcolm Pirnie
100 Fillmore Street, Suite 200
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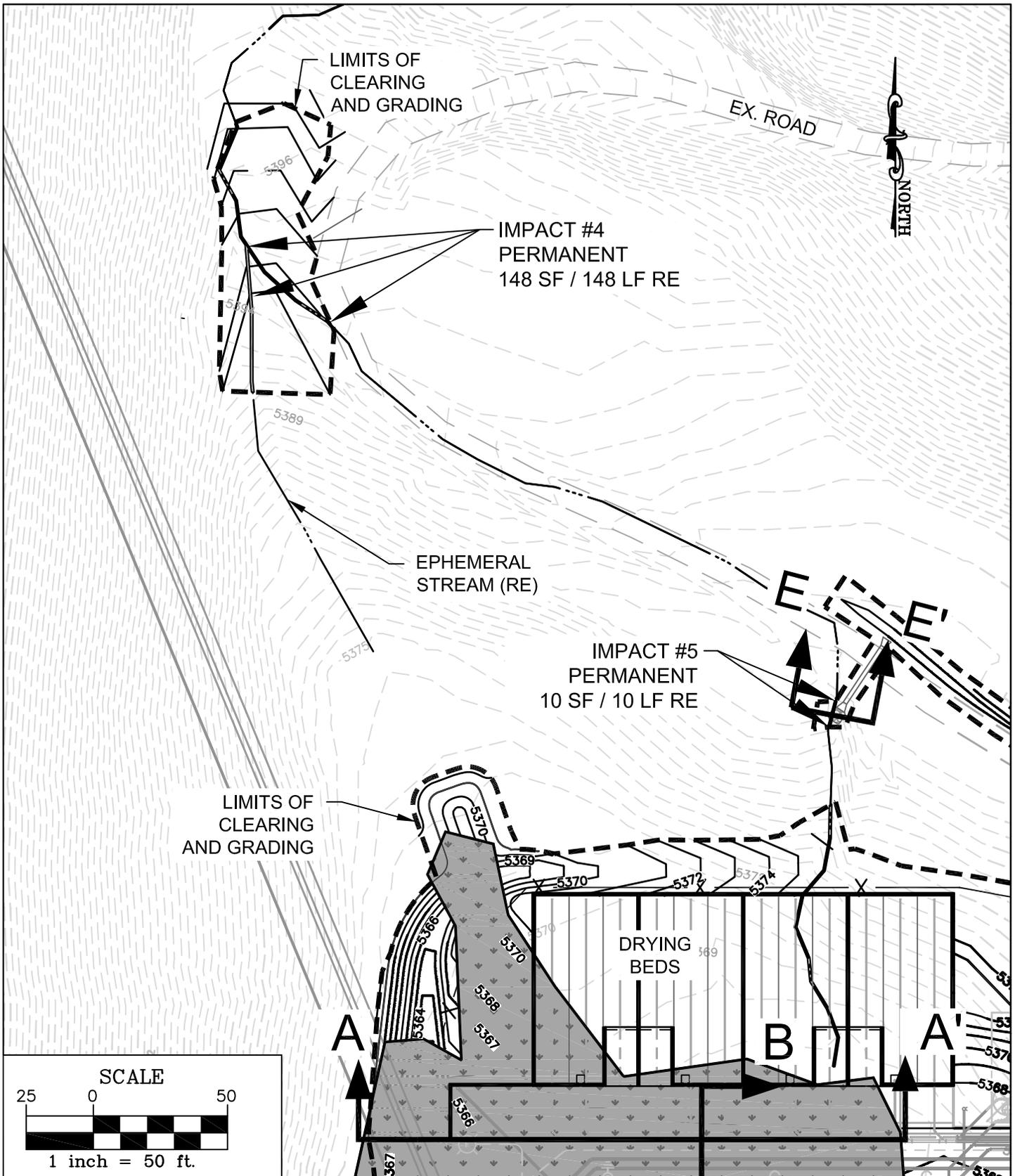
RIFLE REGIONAL WATER
PURIFICATION FACILITY
PROFILE VIEW
IMPACT 3
City of Rifle, Colorado

SECTION D - D'

Date: NOVEMBER 2012

Scale: H: 1" = 30'
V: 1" = 3'

Sheet: 11 of 13



Topography provided by Bookcliff Survey Services, Inc.; proposed improvements provided by SGM and Malcolm Pirnie and are used as a base for this exhibit.

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RIFLE REGIONAL WATER PURIFICATION FACILITY

Wetland Plan View

Proposed Impacts to Nontidal Waters of the U.S.

City of Rifle, Colorado

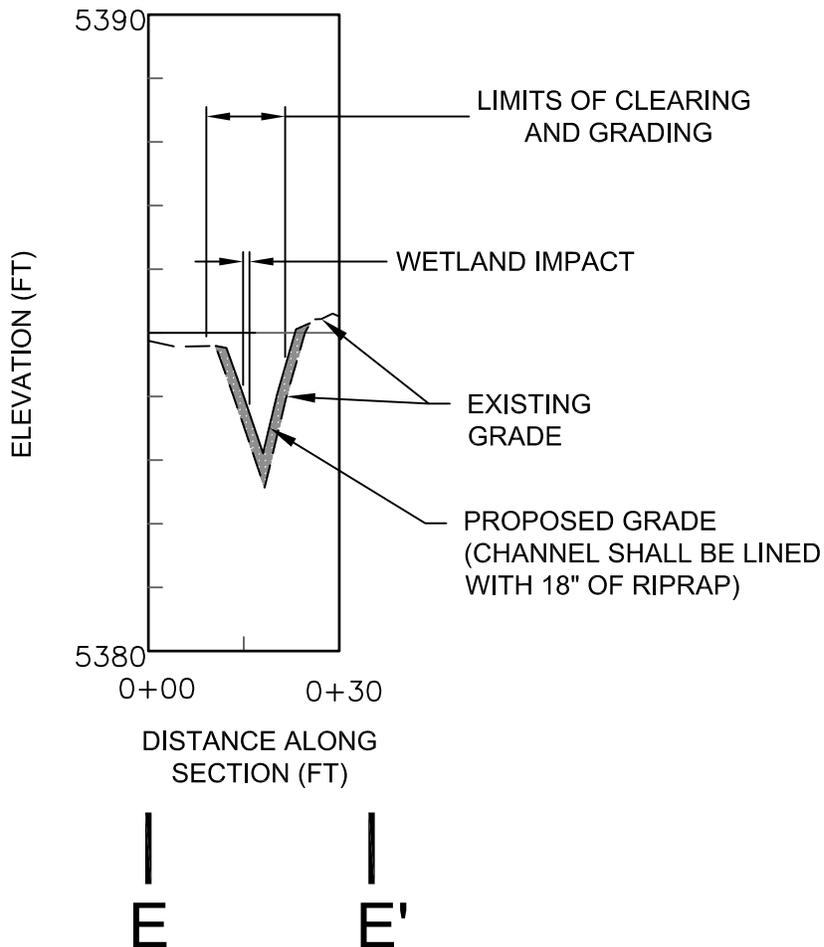
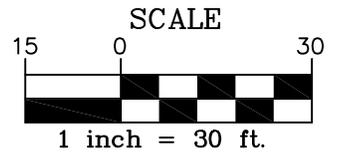
IMPACT #4
 148 SF / 148 LF RE
 PERMANENT

IMPACT #5
 10 SF / 10 LF RE
 PERMANENT

Date: NOVEMBER 2012

Scale: 1" = 50'

Sheet: 12 of 13



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RIFLE REGIONAL WATER
PURIFICATION FACILITY
PROFILE VIEW
IMPACT 5
City of Rifle, Colorado

SECTION E - E'

Date: NOVEMBER 2012

Scale: H: 1" = 30'
V: 1" = 3'

Sheet: 13 of 13